## STATE OF WEST VIRGINIA EXECUTIVE DEPARTMENT

## At Charleston

## **EXECUTIVE ORDER NO. 3-14**

## By the Governor

WHEREAS, the pursuit of technological innovation through the mastery of science, technology, engineering, and math (STEM) is critical to building a foundation in West Virginia for robust manufacturing, enhanced productivity and ingenuity, quality health care services, a healthy environment, and strong national security; and

WHEREAS, the creation, development, installation, and operation of new technologies are essential to building this foundation, yet doing so requires a workforce that has acquired the requisite skill and knowledge in the areas of STEM; and

WHEREAS, our State is home to invaluable STEM resources, including the National Radio Astronomy Observatory and the National Youth Science Camp; and

**WHEREAS**, West Virginia high school students are more likely to be interested in STEM professions than students nationwide (27.7% vs. 25.5%); and

WHEREAS, increasing the availability of science classes will provide students with essential skills and knowledge for success later in life, including opportunities for scientific research, analytical thinking, and real-world problem solving; and

**WHEREAS**, recent economic development opportunities in our State require a strategic expansion of STEM workforce availability over the next five years; and

WHEREAS, it is incumbent upon our State to revitalize student interest in STEM education in West Virginia, capitalize on the availability of federal STEM initiatives, and facilitate State partnerships that prepare our students and workforce for the jobs of the future.

**NOW, THEREFORE, I, EARL RAY TOMBLIN,** by virtue of the authority vested in me as the Governor of the State of West Virginia, do hereby **ORDER** that:

- The West Virginia Council on STEM (Science, Technology, Engineering, and Mathematics) is hereby created.
- 2. The Governor shall appoint at least twelve members to act as a steering committee, each serving at the will and pleasure of the Governor.
- 3. The Council shall consist of the following individuals:
  - a. The Governor or his designee, who shall serve as Chair;
  - b. The Chancellor of the Higher Education Policy Commission or designee;
  - c. The Chancellor of the Community and Technical College System or designee;
  - d. The State Superintendent of Schools or designee;
  - e. The Secretary of the Department of Commerce or designee;
  - f. The following eight individuals, appointed by the Governor, who shall serve at his will and pleasure:
    - i. A member of the West Virginia Board of Education;
    - ii. One representative from the oil and gas industry;
    - iii. One representative with expertise in utilizing derivatives extracted from wet natural gas in the petrochemical industry;
    - iv. A representative from the technology industry;
    - v. A representative from the manufacturing industry;
    - vi. A representative from the logistics industry;

- vii. A representative from the aerospace industry;
- viii. A representative from the chemical industry.
- 4. The Governor may appoint additional members to the Council, to serve at his will and pleasure.
- 5. The Council shall collaborate to achieve the following goals for STEM education and workforce planning:
  - a. Improve measurable STEM outcomes for students;
  - b. Improve STEM instruction in West Virginia schools by enhancing K-12 STEM education, STEM teacher preparation and training, and support for the existing STEM teacher workforce.
  - c. Increase public engagement in STEM efforts;
  - d. Engage with STEM-centric business partners;
  - e. Increase the number of graduates with degrees in STEM fields over the next ten years, targeting groups that have been underrepresented in STEM fields in the next ten years, particularly women; and
  - f. Enhance the STEM experience of post-secondary students and design post-secondary education and training for tomorrow's STEM workforce, including opportunities to gain basic and applied research expertise and to acquire specialized skills in areas of importance to West Virginia, mission-critical workforce needs, and other ancillary skills needed for success in a broad range of careers;
  - g. Explore the "STEM Education and Training" advanced career sequence offered by Southern Regional Education Board to determine its relevance to West Virginia's need for STEM-trained students; and
  - h. Tailor secondary and post-secondary STEM programs to prepare students in the areas of energy technologies and natural gas derivatives in the petrochemical industry.

The council shall submit its findings and recommendations to the Governor by December 1, 2014.

IN WITNESS WHEREOF, I have hereunto set my hand and caused the Great Seal of the State of West Virginia to be affixed.



**DONE** at the Capitol, in the City of Charleston, State of West Virginia, this eleventh day of April, in the year of our Lord, Two Thousand Fourteen, and in the One Hundred Fifty-First year of the State.

By the Governor

SECRETARY OF STATE